# Server Technology Technical Data Sheet

Sentry® Power Manager
SPM version 6.1 with API and Hub-and-Node options

April 2017 | Version 1.0

The Server Technology® SPM is an appliance-based (server or VMware) system designed to provide a single-point of access and monitoring for one or more data centers full of cabinet PDUs (CDU®s). SPM includes extensive browser-based GUI features for direct access to power and environmental information, and can be used as "mid-dle-ware" to another system through use of the optional API. For very large data center networks, the optional Hub-and-Node architecture provides localized data gathering and access control while providing global configuration management.





# **Features**

# **Custom NOC Views**

Create home-login and alternate views on a per-user basis to provide convenient monitoring of relevant data points within the system. Create a slideshow to cycle Views within the NOC

# **Auto-Discovery**

Server Technology CDUs are shipped ready to be identified by SPM and brought into the system and configured automatically

# **CDU Configuration**

Update names and alert thresholds individually or in groups. Use Server Technology's unique SNAP feature to push security, access, and firmware update settings to the CDU

# **Aggregation Devices**

Raw data from the CDUs in the form of infeeds and outlets can be tied together as Cabinet Devices, Zones, and Circuits as they represent the physical power infrastructure architecture

# **Reports**

Numerous data reports in a variety of formats inform data center personnel. These include billing, carbon-footprint, cabinet redundancy check, U-space check, energy used, and many more

#### **Trends**

View, print, and email graphical trends of all metrics to review min/avg/max levels, predictive analysis, and alarm breaches. Overlay different time periods such as this month with last month, or overlay different metrics such as power and temperature for advanced analysis

# Logs

Traceability is maintained with logging of discovery, user login, user actions, and alarms. Syslog support, SNMP trap forwarding, and email notifications expand that record-keeping functionality

# **Scheduling**

Take control of power usage with scheduled outlet control actions. Discover new CDUs whenever they are installed. Send relevant reports and trends via email to those who need it most, when they need it

#### **Access Control**

Secure access to particular segments of the data center and/or keep particular actions from occurring without authority using the extensive integral access rights authenticated locally, or against LDAP or TACACS+ servers. Upload your own SSL Certs for added security

# **Specifications**

#### Appliance Specifications - Redundant High-Performance Model

- Form Factor: 1RU
- Processor: Intel Xeon E3-1230v3 3.3 8M
  - 4C/8T LGA-1150 Box
- Memory: (4) x 4GB PC3-12800 ECC/Unbuffered
  - STD DDR3 1600 Samsung
- Storage: (2) x Seagate 10K.8 600GB 512E Secure
  - 6-Gb/s SAS 2.5in 64MB
- RAID: Adaptec 6405E RAID
  - SAS 2.0 4PT INT PCIE LP
- Ports: (4) x Ethernet, (1) x IPMI, (4) x USB 3.0, (1) x VGA, (1) x DB-9 serial
- Power Draw: 100W max

#### **VMware Requirements**

- Format: 64-bit virtualization required on VMware Server 7 (runs on vSphere 4 & 5, and ESXi 4 & 5)
- Alternate Format: 64-bit virtualization required on VMware Player 3.x
- (1) x network port, [connect at power on], [automatic MAC address], [adaptor=E1000]
- 250GB storage space (can be thin provisioned)
- (2) x processor cores at 2.3Ghz+, minimum
- 2GB RAM, minimum

#### **Network Requirements**

- Port 161 & 162 open for SNMP communication to monitored devices
- Port 443 open for SSL communication to Server Technology SNAP enabled CDUs
- Port 21 (FTP), 22 (SSH), 23 (Telnet), 27 (SFTP), 80 (HTTP) for access to SPM as desired
- Port 26 (SMTP), 49 (TACACS+), 389 or 636 (LDAP), 514 (Syslog) as desired

#### Compatibility for Power and Environmental Monitoring

- Server Technology Smart, Switched, Smart POPS®, and Switched POPS® CDUs, firmware v5.3 or higher
- APC Metered, Switched, and Metered-by-Outlet PDUs, firmware v3.5 or higher
- Avocent ACS 4, 5000, 6000; PM1000, PM2000, PM3000 series PDUs
- Baytech MMP, MRP, MSP series PDUs
- Chatsworth eConnect
- Cyberswitching Dualcom series PDUs
- Eaton ePDU Managed and Monitored (various)
- Geist EM40, EM8, RCM, RCMO, RCU, RCUO, RSP series PDUs
- Liebert MPX/MPH
- Raritan PX, PX2, and PX3 series PDUS, firmware v2.1 or higher
- Starline CPM Bussway End Feed and Plug-In
- Tripp Lite PowerAlert
- Other rack/cabinet PDUs may be available contact your Server Technology representative
- RF Code Zone Manager (optional SPM-RFC license key required)
- Custom Device Template for monitoring other SNMP-based power devices (optional SPM-CDT license key required)

# Specifications Cont.

#### Web Browser Support

- Microsoft Internet Explorer 7.0 or later
- Mozilla Firefox
- Google Chrome
- Apple Safari
- Opera

#### API (optional) Specifications

- Part number for license key: SPM-API
- Representational State Transfer (REST) support
- Simple Object Access Protocol (SOAP) support
- Services: Most objects are available for data retrieval and setup. Contact your Server Technology representative for details
- Third-party API integrations: BitFit, Cisco IT 360, Cormant CableSolve, CrestPoint Solutions FM&E, FieldView Solutions, Integrated Building Solutions IBIS, Nlyte, Siemens WinPM.Net, Trackit Solutions

**Warranty:** Server Technology offers a standard 2-year limited parts & labor warranty. Extended warranty not available on the SPM server appliances. See the Support Options on the website, or contact your local Server Technology representative for more information.

Patents: Information on Server Technology patents is available on the website at:

#### www.servertech.com/products/patents

HDOT, PIPS, POPS, CDU, Sentry, Server Technology, the ST Eye logo, and the globe logo are U.S. registered trademarks of Server Technology, Inc. Power Pivot, EZip, StartUp Stick and PRO2 are trademarks of Server Technology, Inc.

Information in this document is current as of time of publishing. Contact your Server Technology representative for the most up-to-date information. © 2014 - 2017 Server Technology, Inc.



#### North America Headquarters

1040 Sandhill Road Reno, Nevada 89521 1-775-284-2000 Tel 1-800-835-1515 Toll Free 1-775-284-2065 Fax sales@servertech.com www.servertech.com www.servertechblog.com

#### U.K. Western Europe, Israel & Africa

Fountain Court
2 Victoria Square
Victoria Street
St. Albans
AL1 3TF
United Kingdom
+44 (0) 1727 884676 Tel
+44 (0) 1727 220815 Fax
salesint@servertech.com

# Germany Central Europe, Eastern Europe & Russia

Westhafen Tower Westhafenplatz 1 60327 Frankfurt Germany +49 697 1045 6205 To

10th + 11th Floor

+49 697 1045 6205 Tel +49 697 1045 6450 Fax salesint@servertech.com

#### **Hong Kong APAC**

Level 43, AIA Tower 183 Electric Road, North Point, Hong Kong +852 3975 1828 Tel +852 3975 1800 Fax salesint@servertech.com

#### India & Middle-East

Regus Municipal No. 3, Old Madras Road, Benniganahalli village, Krishnarajpuram Hobli, RMZ Infinity, 1st floor, Tower D, Bengaluru, Karnataka 560016 India +91 99022 44534 Tel salesint@servertech.com